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Symposium

Chlamydia screening:

Is Europe ready for STD screening?

Per-Anders Mårdh

99 Chlamydia screening: which sample for which technique?

Angelika Stary

Is screening for *Chlamydia trachomatis* infection cost effective?

Jorma Paavonen

channel it into effective contact tracing which Mark Fitzgerald's paper in the same issue of the journal² shows to be an area in which the UK genitourinary service is underperforming.

In this clinic we routinely perform tests of cure on all patients with gonorrhoea but I firmly believe that we should continue to assess even our most ingrained practices and ensure that if at all possible they are evidence

GARY BROOK

Department of Genito-Urinary Medicine, Central Middlesex Hospital NHS Trust, Acton Lane, Park Royal, London NW10 7NS

- 1 Carne CA. Epidemiological treatment and tests of cure in gonococcal infection: evidence for value. Genitourin Med 1997;73:12-5.
- 2 Fitzgerald M. Can the management of gonorrhoea be improved? Genitourin Med 1997;73:3-4.

MSSVD

Additions to MSSVD Library 1996

Keyes, Edward L. Urology. Diseases of the urinary organs, diseases of the male genital organs, the venereal diseases. New York & London, Appleton & Co, 1917. The long account of gonorrhoea in this book gives an excellent description of its presentation and management in the USA at the time.

Clare, Peter. A practical treatise on the gonorrhoea, with a brief account of the remedies which have been used in Lues Venerea. Clare was a surgeon working in London. This book contains his views on treating gonorrhoea by urethral injections, a method he had devised for the treatment of syphilis by oral applications of calomel ointment, and a collection of letters between Clare and his patients. Turnbull, William. A letter to Mr Clare. Turnbull was a naval surgeon, and in this letter he discussed the value of Clare's mercurial treatment on board ship. This little book is a delight to read.

McDonnell, Robert. Lectures and essays in the science and practice of surgery. Part 1. Clinical lectures on venereal diseases. Dublin, Fannin & Co, 1871. The influence of the Irish venereologists, Carmichael, and Wallace, is evident, particularly in the long discussion of the treatment of syphilis, which is conservative.

Noguchi, Hideyo. Serum diagnosis of syphilis, 2nd ed. Philadelphia & London, J B Lipincott, 1911. Noguchi was a pathologist, working in New York. The book was published five years after the original description of the Wassermann reaction, and contains much detail of the early studies of syphilis serology.

Lee, Henry. Statistical analysis of 166 cases of secondary syphilis observed at the Lock Hospital. London, Richards, 1849. The author argues that the treatment of primary syphilis with mercury is effective in preventing secondary syphilis, but only if this is prolonged and thorough.

Innes Williams, David. The London Lock. A charitable hospital for venereal diseases, 1746-1952. This is a detailed and entertaining account of the staff and activities of this famous hospital during the years of its exis-

McDonagh, J E R. The biology and treatment of venereal diseases. London, Harrison & Sons, 1915. This is a comprehensive text, with far more detail of current beliefs on the pathology and microbiology of the diseases than was usual at the time.

Falck, Nicolai Detlef. A treatise on the venereal disease. London, Law, 1774. This is a scarce work. Little is known about the author, who seems to have practised in London. The book opens with an illustrated description of genital anatomy. The account of aetiology and clinical features which follows is conventional; like most of his contemporaries, Falck was a unicist. His treatment was conservative, but he wrote in a discursive and almost holistic style which makes the chapters on management of particular interest.

The MSSVD Historical Library is kept in the Library of the Royal Society of Medicine, 1, Wimpole Street, London W1M 8AE.

J D ORIEL Honorary librarian

BOOK REVIEW

Genital Skin Disorders. A Guide to Non-Sexually Transmitted Conditions. Edited by RINO CERIO. London: Chapman & Hall Medical, 1995. (Pp 96; £75.) ISBN 0412-55020-2.

Although atlases of vulval disease and skin manifestations of HIV are available, there is little catering, in a general way, for the needs of genitourinary physicians wishing an overview of the skin diseases they may encounter. This book goes part way to addressing that need.

This is a slim, well presented volume with glossy, illustrated pages, that attempts to appeal to a wide audience. In doing so it may have become too simplistic for genitourinary physicians. For example, in the chapter on normal variants of genital anatomy it states "the testes lie in the scrotum". However, other chapters are much more detailed, as well as being written in a clear, informative style. Numerous illustrations and concise tables (especially the table listing common genital skin disorders) make this a useful and enjoyable book to read.

The title is slightly misleading as, in addition to the chapters covering genital ulcers, melanocytic lesions, tumours, and other genital lesions, cutaneous manifestations of HIV disease are also included, suggesting a bias towards dermatology for genitourinary physicians. Genital warts are also mentioned, as are molluscum, scabies, and pediculosis pubis and, although important, they do not necessarily fall under the subtitle of "A guide to non-sexually transmitted conditions". Other topics include diseases of the skin appendages, autoimmune and bullous conditions, and systemic diseases affecting the genital skin, and a useful chapter on the psychosocial aspects of genital skin disease.

Despite these criticisms, the book covers the range of dermatology which a genitourinary physician might expect to see and is provided with a comprehensive index, so "dipping in" is easy. Unfortunately, the price seems high for such a slim volume (which has frequent typographical errors), and this may persuade readers to opt for a more comprehensive dermatological text.
SARAH EDWARDS

NOTICES

ISBS Symposium on Skin Imaging, 16-18 April 1997

The International Society for Bioengineering and the Skin will hold a symposium on skin imaging in Casablanca, Morocco. Further details: Christiane Grillier-Maryse Graner, Service Congrès, Université de Franche-Comté, 1 rue Claude Goudimel, F-25030 Besançon, France. Tel: +33 3 81 66 58 10; Fax: +33 3 81 66 58 12; email: cgrillier@univ-fcomte.fr

Second International Conference on Nutrition and HIV Infection, 23-25 April, 1997, Cannes France

Further details: Dr Thierry Saint Marc, Pavillon P, Hopital E Herriot, 69437 Lyon Cedex 03, France. Tel 33-72-11-01-95; Fax 33-72-33-00-44.

Integrated Sexual Health Services. A model for the future? 30 April 1997

A one day conference to share the experiences of setting up and running an integrated sexual health service. The conference will be held at the Post Graduate Medical Centre, Wexham Park Hospital, Slough, Berkshire on Wednesday 30 April 1997: Further details: Val Britton, Sexual Health Service, The Garden Clinic, Upton Hospital, Slough, Berks SL1 2BJ. Tel: 01753 635603; Fax: 01753 536938.

97th General Meeting of the American Society for Microbiology, 4-8 May, 1997, Miami Beach, Florida, USA

Further details: American Society for Microbiology (ASM), Meetings Dept, 1325 Massachusetts Avenue NW, Washington, DC 20005-4171, USA. Tel 202-942-9297 or 202-942-9206; Fax 202-942-9267.

9th Conference on the Social Aspects of AIDS, 10 May, 1997, London

Further details: Michael Stephens, SIGMA Research, Eurolink Centre, 49 Effra Road, London SW1 1BZ. Tel +44 171 7376223; Fax +44 171 7377898.

3rd International Conference on Home and Community Care for Persons Living with HIV/AIDS, 21-24 May, 1997, Amsterdam, the Netherlands

Further details: Bureau PAOG, Ms Mariska Timmers/Mr Clemens Walta, Tafelbergweg 25, 1105 BC, Amsterdam, the Netherlands. Tel +31 20 566 4801; Fax +31 20 696 3228.

8th European Congress of Clinical Microbiology and Infectious Disease, 25-28 May, 1997, Lausanne, Switzerland Further details: Administrative Secretariat, c/o AKM Congress Service, PO Box, CH-4005 Basel, Switzerland. Tel +41 61 691 51 11; Fax +41 61 691 81 89.

18th Annual Congress of the European Society of Mycobacteriology (ESM-97), 17-18 June, 1997, Cordoba, Spain

Further details: Congress Secretariat of ESM-97 and ISM-97, Vincit International Agency, Plaza de Espana no LIST18, Toree de Madrid, Planta no 10, 28008 Madrid, Spain. Tel 34-1-5590426; Fax 34-1-5592505.

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3rd International Conference on AIDS Impact—Biopsychosocial Aspects of HIV Infection, 22-25 June, 1997, Melbourne, Australia

Further details: Conference Secretariat, AIDS Impact, the Meeting Planners, 108 Church Street, Hawthorn, Victoria, Australia 3122. Tel +61-3-9819-3700; Fax +61-3-9819-5978.

VI International Berlin Conference for Sexology: 100 Years of Gay Liberation, 25-27 July, 1997, Berlin, Germany

Further details: Rolf Gindorf, DGSS, Gerresheimer Strasse 20, D-40211 Dusseldorf, Germany. Fax +49 211 360

37th Annual Meeting of the Interscience Conference on Antimicrobial Agents and Chemotherapy (ICAAC), 28 September-1 October, 1997, Toronto, Ontario, Canada

Further details: American Society for Microbiology (ASM), Meetings Dept, 1325 Massachusetts Avenue NW, Washington, DC 20005-4171, USA. Tel 202-942-9297 or 202-942-9206; Fax 202-942-9267.

Sixth European Conference on Clinical Aspects and Treatment of HIV-Infection, 11-15 October, 1997, Hamburg, Germany

Further details: Professor Dr M Dietrich, Sixth European HIV-Conference, Bernhard-Nocht-Institute for Tropical Medicine, Bernhard-Nocht-Strasse 74, D-20359 Hamburg, Germany. Tel +49-40-31182 390; Fax +49-40-31182 394.

Gynaecological Oncology, 17 November 1997

A symposium on gynaecological oncology will be held at Queen Charlotte's and Chelsea Hospital, London. Further details: Symposium Secretary, RPMS Institute of Obstetrics & Gynaecology, Queen Charlotte's and Chelsea Hospital, Goldhawk Road, London W6 0XG. Tel: 0181-383 3904; Fax: 0181-383 8555; email: symposia @rpms.ac.uk

4th International Congress on AIDS in Asia and the Pacific, 18-22 November, 1997, Manila, Philippines

Further details: Dr Ofelia T Monzon, Chair, Organising Committee, 4th International Congress on AIDS/STD in Asia-Pacific. Fax +63 2 711 6693.

The Practice of Psychosexual Medicine, 19-20 November 1997

A two day course on the practice of psychosexual medicine will be held at Queen Charlotte's and Chelsea Hospital, London. Further details: Symposium Secretary, RPMS Institute of Obstetrics & Gynaecology, Queen Charlotte's and Chelsea Hospital, Goldhawk Road, London W6 0XG. Tel: 0181-383 3904; Fax: 0181-383 8555; email: symposia@rpms.ac.uk

Xth International Conference on AIDS and STDs in Africa, 7-11 December, 1997, Abidjan, Ivory Coast

Further details: Professor A Kadio, Conference Chairman, Programme Nationale de lutte contre le SIDA, les MST et de la Tuberculose, Boite Postale 2113, Abidjan 04, Ivory Coast. Tel +225 24 30 13; Fax +225 24 31 19.

12th International Symposium on Bioengineering and the Skin will be held on 25-27 June, 1998, in Boston, MA, USA. Further details: R Randall Wickett, PhD, University of Cincinnati, College of Pharmacy, 3223 Eden Avenue, Cincinnati, OH 45267, USA. email: randy.wickett @uc.edu; http://www.fugazy.com/ISBS; Toll free phone number in the US 1-888-FET-GRPS (388-4777); Fax: +1-(601) 366-8682.

CURRENT PUBLICATIONS

Selected titles from recent reports published worldwide are arranged in the following sections:

Gonorrhoea
Chlamydia
Candidiasis
Bacterial vaginosis
Trichomoniasis
Syphilis and other treponematoses
Hepatitis
Herpes
Human papillomavirus infection
Cervical cytology and colposcopy
Other sexually transmitted diseases
Public health and social aspects
Microbiology and Immunology
Dermatology
Miscellaneous

Gonorrhoea

Sexual partner networks in the transmission of sexually transmitted diseases: an analysis of gonorrhoea cases in Sheffield, UK

AC GHANI, CA ISON, H WARD, et al. Sex Transm Dis 1996;23:498-503.

The role of sexual partnership networks in the epidemiology of gonorrhoea

AC GHANI, J SWINTON, GP GARNETT. Sex Transm Dis 1997;24:45-56.

Comparison of ligase chain reaction and culture for detection of *Neisseria gonor-rhoeae* in genital and extragenital specimens

A STARY, SF CHING, L TEODOROWICZ, H LEE. $\mathcal J$ Clin Microbiol 1997;35:239–47.

Effect of off-site transportation of detection of *Neisseria gonorrhoeae* in endocervical specimens

PC IWEN, RA WLAKER, KL WARREN, et al. Arch Pathol Lab Med 1996;120:1019-22.

Antimicrobial resistance in Neisseria gonorrhoeae

I LIND. Clin Infect Dis 1997;24:S93-S97.

Comparison of single-dose cefuroxime axetil with ciprofloxacin in treatment of uncomplicated gonorrhea caused by penicillinase-producing and non-penicillinase-producing Neisseria gonorrhoeae strains EM THORPE, JR SCHWEBKE, EW HOOK, et al. Antimicrob Agents Chemother 1996;40:2775–95.

Molecular epidemiology, in 1994, of Neissera gonorrhoeae in Manila and Cebu City, Republic of the Philippines

JS KNAPP, VP MESOLA, SW NEAL, et al. Sex Transm Dis 1997;24:2-7.

Antibiotic susceptibility patterns and plasmid profiles of penicillinase-producing Neisseria gonorrhoeae strains in Durban, South Africa, 1990–1993

HY CHENG, B PILLAY, AA HOOSEN, D PILLAY. Sex Transm Dis 1997;24:18-22.

Comparative assessment of Etest for testing susceptibilities of *Neisseria gonor-rhoeae* to penicillin, tetracycline, ceftriaxone, cefotaxime and ciprofloxacin: investigation using 510(k) review criteria, recommended by the food and drug administration

DJ BIEDENBACH, RN JONES. \mathcal{J} Clin Microbiol 1996;34:3214–34.

Identification and purification of a hemoglobin-binding outer membrane protein from *Neisseria gonorrhoeae*

CJ CHEN, PF SPARLING, LA LEWIS, et al. Infect Immun 1996;64:5008-14.

Immunogenicity of Neisseria gonorrhoeae lipooligosaccharide epitope 2C7, widely expressed in vivo with no immunochemical similarity to human glycosphingolipids S GULATI, DP MCQUILLEN, RE MANDRELL, et al. J Infect Dis 1996;174:1223–37.

Experimental immunization with a monoclonal anti-idiotope antibody that mimics the *Neisseria gonorrhoeae* lipooligosaccharide epitope 2C7

S GULATI, DP MCQUILLEN, J SHARON, PA RICE. J Infect Dis 1996;174:1238-48.

Genome plasticity in Neisseria gonor-rhoeae

CP GIBBS, TF MEYER. FEMS Microbiol Lett 1996;145:173–80.

Pseudo-transposition of a Tn5 derivative in Neisseria gonorrhoeae

CE THOMAS, NH CARBONETTI, G BOUREL, et al. FEMS Microbiol Lett 1996;145:371-6.

Chlamydia

Epidemiologic and microbiologic correlates of *Chlamydia trachomatis* infection in sexual partnerships

TC QUINN, C GAYDOS, M SHEPHERD, et al. *JAMA* 1996;276:1737–42.

Predictors of *Chlamydia trachomatis* infection among female adolescents: a longitudinal analysis

DJ MOSURE, S BERMAN, D KLEINBAUM, ME HALLORAN. Am J Epidemiol 1996;144:1997.

A tale of two sexually transmitted diseases: prevalences and predictors of chlamydia and gonorrhoea in women Colorado family planning clinics

KA GERSHMAN, JC BARROW. Sex Transm Dis 1996;23:481-8.

Efficacy and safety of azithromycin versus lymecyline in the treatment of genital chlamydial infections in women

C BRIHMER, PA MARDH, I KALLINGS, et al. Scand J Infect Dis 1996;28:451-4.

Patient-administered tampon-collected genital cells in the assessment of Chlamydia trachomatis infection using polymerase chain reaction

SN TABRIZI, SJ CHEN, AJ BORG, et al. Sex Transm Dis 1996;23:494-7.

Current methods of laboratory diagnosis of Chlamydia trachomatis infections
CM BLACK. Clin Microbiol Rev 1997;10:160-84.

Confirmation of the Syva MicroTrak enzyme immunoassay for Chlamydia trachomatis by Syva direct fluorescent antibody test

JL BEEBE, H MASTERS, D JUNGKIND, et al. Sex Transm Dis 1996;23:465-470.

Comparison of manual Amplicor PCR, Cobas Amplicor PCR and LCR assays for detection of *Chlamydia trachomatis* infection in women by using urine specimens

R PASTERNACK, P VUORINEN, T PITKAJARVI, et al. J Clin Microbiol 1997;35:402-5.

Performance characteristics of the Gen-Probe Probe Competition Assay used as a supplementary test for the Gen-Probe OACE 2 and 2C assays for detection of Chlamydia trachomatis

JL BEEBE, TR SHARPTON, SM ZANTO, et al. J Clin Microbiol 1997;35:477-81.

Detection of PCR inhibitors in cervical specimens by using the AMPLICOR Chlamydia trachomatis assay

RP VERKOOYEN, A LUIJENDIJIK, WM HUISMAN, et al. J Clin Microbiol 1996;34:3072-91.

RNA amplification by nucleic acid sequence-based amplification with an internal standard enables reliable detection of *Chlamydia* in cervical scrapings and urine samples

SA MOORE, P SILLEKENS, MV JACOBS, et al. J Clin Microbiol 1996;34:3108-28.

Comparison of *Chlamydia* serologic tests with respect to antibodies against *Chlamydia trachomatis*

A OEHME, A GROH, E STRAUBE. Med Microbiol Lett 1996;5:408-17.

Vesicular interactions of the Chlamydia trachomatis inclusion are determined by chlamydial early protein synthesis rather than route of entry

MA SCIDMORE, DD ROCKEY, ER FISCHER, et al. Infect Immun 1996;64:5366-71.

Initial route of antigen administration alter the T-cell cytokine profile produced in response to the mouse pneumonitis biovar of *Chlamydia trachomatis* following genital infection

KA KELLY, EA ROBINSON, RG RANK. Infect Immun 1996;64:4976–84.

Effects of nonoxynol-9 on vaginal microflora and chlamydial infection in a monkey model

DL PATTON, GG KIDDER, YC SWEENEY, et al. Sex Transm Dis 1996;23:461-4.

Intranasal immunization induces longterm protection in mice against a Chlamydia trachomatis genital challenge S PAL, EM PETERSON, LM DELAMAZA. Infect Immun 1996;64:5341-56.

Tumor necrosis factor-alpha response to infection with *Chlamydia trachomatis* in human fallopian tube organ culture KA AULT, OW TAWFIK, MM SMITHKING, et al.

Am J Obstet Gynecol 1996;175:1242-5.

Secretion of proinflammatory cytokines by epithelial cells in response to Chlamydia infection suggests a central role for epithelial cells in chlamydial pathogenesis

SJ RASMUSSEN, L ECKMANN, AJ QUAYLE, et al. J Clin Invest 1997;99:77-87.

Interferon-gamma and interleukin-5 production by mice in response to genital infection by the mouse pneumonitis agent of *Chlamydia trachomatis*

SJ BLANDER, AJ AMORTEGUI. Sex Transm Dis 1997;24:38-44.

Candidiasis

CD4(+) T-helper-cell responses in mice with low-level Candida albicans infection A MENCACCI, R SPACCAPELO, G DELSERO, et al. Infect Immun 1996;64:4907-14.

Migration of the fungal pathogen Candida albicans across endothelial monolayers
A ZINK, T NASS, P ROSEN, JF ERNST. Infect Immun 1996;64:5085-91.

Importance of beta(2)-microglobulin in murine resistance to mucosal and systemic candidiasis

E BALISH, FA VASQUEZTORRES, J JONESCARSON, et al. Infect Immun 1996;64:5092-105.

Candida and Torulopsis: a blinded evaluation of use of pseudohypha formation as basis for identification of medically important yeasts

FC ODDS, MG RINALDI, CR COOPER, et al. J Clin Microbiol 1997;35:313-6.

Signal transduction through homologs of the Ste20p and Ste7p protein kinases can trigger hyphal formation in the pathogenic fungus *Candida albicans*

E LEBERER, D HARCUS, ID BROADBENT, et al. Proc Nat Acad Sci USA 1996;93:13217-22.

Bacterial vaginosis

Comparison of Gram-stained smears prepared from blind vaginal swabs with those obtained at speculum examination for the assessment of vaginal flora

DJ MORGAN, CJ ABOUD, IMB MCCAFFREY, et al. Br J Obstet Gynaecol 1996;103:1105-8.

Lactobacilli from women with or without bacterial vaginosis and observations on the significance of hydrogen peroxide

EA FONTAINE, E CLAYDON, D TAYLOR ROBINSON. Microb Ecol Health Dis 1996;9: 135–42.

Use of a lactoferrin assay in the differential diagnosis of female genital tract infections and implications for the pathophysiology of bacterial vaginosis

MF REIN, LM SHIH, JR MILLER, RL GUERRANT. Sex Transm Dis 1996;23:517-21.

Trichomoniasis

Clinical and microbiological correlates of vaginal trichomoniasis during pregnancy JG PASTOREK, MF COTCH, DH MARTIN, et al. Clin Infect Dis 1996;23:1075-80.

Colorimetric one-tube nested PCR for detection of *Trichomonas vaginalis* in vaginal discharge

MF SHAIO, PR LIN, JY LIU. J Clin Microbiol 1997;35:132-43.

Syphilis and other treponematoses

Fracastoro and syphilis: 500 years on MM HUDSON, RS MORTON. *Lancet* 1996;348: 1495-6.

Problems in the current case definitions of congenital syphilis

WL RISSER, LY HWANG. J Pediat 1996;129: 499-505.

Congenital syphilis: detection of Treponema pallidum in stillborns
SA RAWSTRON, J VETRANO, G TANNIS, K BROMBERG. Clin Infect Dis 1996;24:24-7.

Syphilis and the risk of penis cancer M FRISCH, BB JORGENSEN, S FRIIS, M MELBYE. Sex Transm Dis 1996;23:471-4.

Hepatitis

Hepatitis E virus infection in individuals at high risk of transmission of non-A, non-B hepatitis and sexually transmitted diseases

M PSICHOGIOU, E TZALA, J BOLETIS, et al. Scand J Infect Dis 1996;28:443-6.

Immunogenicity of a recombinant hepatitis B vaccine in adults

HL BOCK, J KRUPPENBACHER, R SANGER, et al. Arch Intern Med 1996;156:2226–32.

Nonresponse to hepatitis B vaccines and the kinetics of anti-HBs production
JN ZUCKERMAN. J Med Virol 1996;50:283-8.

Herpes

Detection of herpes simplex virus in clinical specimens by cytospin-enhanced direct immunofluorescence

ML LANDRY, D FERGUSON, J WLOCHOWSKI. J Clin Microbiol 1997;35:302-4.

Masters of deception: a review of herpesvirus immune evasion strategies

NJ DAVISPOYNTER, HE FARRELL. Immunol Cell Biol 1996;74:513-22.

Inhibition of herpes simplex virus reactivation by dipyridamole in a mouse model KA HAY, A GAYDOS, RB TERISER. J Med Virol 1996;50:198–203.

Effects of the estrous cycle on local humoral immune responses and protection of intranasally immunized female mice against herpes simplex virus type 2 infection in the genital tract

WS GALLICHAN, KL ROSENTHAL. Virology 1996; 224:487-97.

DNA immunization confers protective immunity on mice challenged intravaginally with herpes simplex virus type 2
N BOURNE, GN MILLIGAN, MR SCHLEISS, et al.

Vaccine 1996;14:1230-4.

Herpes simplex virus type 2 inhibition of Fas ligand expression S SIEG, Z YILDIRIM, D SMITH, et al. J Virol 1996;

Human papillomavirus infection

70:87**4**7–57.

Risk factors for HPV DNA detection in middle-aged women

N MUNOZ, I KATO, FX BOSCH, et al. Sex Transm Dis 1996;23:504–10.

Anal and cervical abnormality in women—prediction by human papillomavirus tests

M MELBYE, E SMITH, J WOHLFAHRT, et al. Int $\mathcal J$ Cancer 1996;68:559-64.

A population-based case-control study of human papillomavirus-type-16 seropositivity and incident high-grade dysplasia of the uterine cervix

AO OLSEN, J DILLNER, K GJOEN, et al. Int J Cancer 1996;68:415-9.

Prevalence of anal human papillomavirus infection and anal cytologic abnormalities in HIV-seropositive women

P HILLEMANNS, TV ELLERBROCK, S MCPHILLIPS, et al. AIDS 1996;10:1641-8.

Different HLA-DQ haplotypes are associated with cervical intraepithelial neoplasia among human papillomavirus type-16 seropositive and seronegative Swedish women CB SANJEEVI, P HJELMSTROM, G HALLMANS, et al. Int J Cancer 1996;68:409-14.

Cervical mucus antibodies against human papillomavirus type 16, 18 and 33 capsids in relation to presence of viral DNA ZH WANG, BG HANSSON, O FORSLUND, et al. 3

Clin Microbiol 1996;34:3056–62.

Status of local cellular immunity in interferon-responsive and non-responsive human papillomavirus-associated lesions I ARANY, SK TYRING, Sex Transm Dis 1996; 23:475-80.

Synthesis, properties and applications of papillomavirus-like particles

M SAPP, C VOLPERS, RE STREECK. Intervirology 1996;39:49-53.

Papillomavirus-like particles for serology and vaccine development

T KIRNBAUER. Intervirology 1996;39:54-61.

Diagnostic performance of hybrid capture human papillomavirus deoxyribonucleic acid assay combined with liquid-based cytologic study

A FERENCZY, E FRANCO, J ARSENEAU, et al. Am J Obstet Gynecol 1996;175:651-6.

Oncongenic human papillomaviruses and ploidy in cervical lesions

S RIHET, M LORENZATO, C CLAVEL. J Clin Pathol 1996;49:892-6.

High Sp1/Sp3 ratios in epithelial cells during epithelial differentiation and cellular transformation correlate with the activation of the HPV-16 promoter

D APT, RM WATTS, G SUSKE, HU BERNARD. Virology 1996;224:281-313.

Differential expression of the monocyte chemoattractant protein-1 gene in human papillomavirus-16-infected squamous intraepithelial lesions and squamous cell carcinomas of the cervix

L RIETHDORF, S RIETHDORF, K GUTZLAFF, et al. Am J Pathol 1996;149:1469-76.

Up-regulation of hormone response of human papillomavirus type 16 expression and increased DNA-protein binding by consensus mutations of viral glucocorticoid response elements

S JHARE, KU KUMAR, SC TANG, et al. J Med Virol 1996;50:254-62.

E5 proteins of human papillomavirus types 11 and 16 transactivate the c-fos promoter through the NF1 binding element SL CHEN, YK LIN, LY LI, et al. J Virol 1996; 70:8558-63.

Characterization of a promoter in the E7 open reading frame of human papillomavirus type 11

Y TOMITA, T SHIGA, B SIMIZU. *Virology* 1996; **224**:267–73.

Inactivation of the cdk inhibitor p27(KIP1) by the human papillomavirus type 16 E7 oncoprotein

K ZERFASSTHOME, W ZWESCHKE, B MANNHARDT, et al. Oncogene 1996;13:2323-30.

Dose-dependent regulation of the early promoter of human papillomavirus type 18 by the viral E2 protein

G STEGER, S CORBACH. J Virology 1997;71: 50-8.

Human papillomavirus type 16 sequence variants: identification by E6 and L1 lineage-specific hybridization

CM WHEELER, T YAMADA, A HILDESHEIM, SA JENISON. J Clin Microbiol 1997;35:11-9.

Cervical cytology and colposcopy

Cervical sampling devices—extended tip spatulas (such as the Aylesbury) should replace the Ayre

P SASIENI. BMJ 1996;313:1275.

Relation between sampling device and detection of abnormality in cervical smears: a meta-analysis of randomised and quasi-randomised studies

F BUNTINX, M BROUWERS. *BMJ* 1996;313: 1285-90.

Contribution of the endocervical cytobrush sample to the diagnosis of cervical lesions

R LUZZATTO, ME BOON. *Acta Cytol* 1996;40: 1143-7.

Conventional cervical cytologic smears vs ThinPrep smears—a paired comparison study on cervical cytology

A FERENCZY, J ROBITAILLE, E FRANCO, et al. Acta Cytol 1996;40:1136–42.

Proliferation in the normal cervix and in preinvasive cervical lesions

MK HEATLEY. J Clin Pathol 1996;49:957.

Non-progression of cervical intraepithelial neoplasia estimated from populationscreening data

AB BOS, M VANBALLEGOOIJEN, GJ VANOORT-MARSSEN, et al. Br J Cancer 1997;75:124–30.

The association of age and sexual history with the severity of the histological findings in women with cervical intraepithelial neoplasia

RM REIS, LL OLIVEIRA, MD BRITO. Gynecol Obstet Invest 1996;42:258–60.

Cervical cytology in women with mental retardation

EH QUINT, TE ELKINS. Obstet Gynecol 1997;89: 123-6.

Intra-epithelial and invasive cervical neoplasia during HIV infection

m boccalon, u tirelli, f sopracordevole, e vaccher. *Eur J Cancer* 1996;**32A**:2212–7.

Cytopathological findings on vaginal Papanicolaou smears after hysterectomy for benign gynecologic disease

KF PEARCE, HK HAEFNER, SF SARWAR, TE NOLAN. N Engl J Med 1996;335:1559-62.

Beliefs about sexual behaviour and other predictors of Papanicolaou smear screening among Latinas and Anglo women

FA HUBBELL, LR CHAVEZ, SI MISHRA, RB VALDEZ. Arch Intern Med 1996;156:2353-64.

Detecting structural changes at the molecular level with Fourier transform infrared spectroscopy—a potential tool for prescreening preinvasive lesions of the cervix

HM YAZDI, MA BERTRAND, PTT WONG. *Acta Cytol* 1996;**40**:664–8.

MIB 1 immunostaining in cervical intraepithelial neoplasia: prognostic significance in mild and moderate lesions

GG GARZETTI, A CIAVATTINI, M DENICTOLIS, et al. Gynecol Obstet Invest 1996;42:261-6.

Glandular lesions of the cervix—validity of cytologic criteria used to differentiate reactive changes, glandular intraepithelial lesions and adenocarcinoma

JP DITOMASSO, I RAMZY, DR MODY. *Acta Cytol* 1996;40:1127-35.

Other sexually transmitted diseases

Characterization of a novel lipoprotein expressed by Haemophilus ducreyi

TJ HILTKE, AA CAMPAGNARI, SM SPINOLA. Infect Immun 1996:64:5047.

Public health and social aspects

Young adolescents' comfort with discussion about sexual problems with their physicians

BO BOEKELOO, LA SCHAMUS, TL CHENG, SJ SIMMENS. Arch Ped Adolesc Med 1996;150: 1146-53.

Our view of adolescent sexuality—a focus on risk behavior without the developmental context

AA EHRHARDT. Am J Pub Health 1996;86: 1523-4.

The sexual practices of adolescent virgins: genital sexual activities of high school students who have never had vaginal intercourse

MA SCHUSTER, RM BELL, DE KANOUSE. Am J Pub Health 1996;86:1570-6.

The link between the use of crack cocaine and the sexually transmitted diseases of a clinic population: a comparison of adolescents with adults

JM ELLEN, LM LANGER, RS ZIMMERMAN, et al. Sex Transm Dis 1996;23:511–6.

Microbiology and Immunology

The vaginal microflora of pig-tailed macaques and the effects of chlorhexidine and benzalkonium on this ecosystem

DL PATTON, YC SWEENEY, LK RABE, SL HILLIER. Sex Transm Dis 1996;23:489-93.

High rates of genital Mycoplasma infection in the highlands of Papua New Guinea determined both by culture and by a commercial detection kit

A CLEGG, M PASSEY, M YOANNES, A MICHAEL. J. Clin Microbiol 1997;35:197–207.

Detection of adeno-associated virus type 2 sequences in the human genital tract

M FRIEDMANEINAT, Z GROSSMAN, F MILEGUIR, et al. J Clin Microbiol 1997;35:71–8.

Dermatology

Malignant melanoma of the vulva: report of 89 patients

G RABER, V MEMPEL, C JACKISCH, et al. Cancer 1996;78:2353-8.

Vulvitis circumscripta plasmacellularis (Zoon's vulvitis) associated with autoimmune polyglandular endocrine failure TG SALOPEK, K SIMINOSKI. Br J Dermatol 1996; 135:988-90.

A case-control study of hidradenitis suppurativa in an STD population

L HABBEMMA, K DEBOULLE, GA RODERS, DH KATZ. Acta Dermato-Venereol 1996;76:482-3.

Chondroid syringoma of the scrotum JW POKU, GR SANT, AA UCCI. J Int Med Res 1996:24:482-6.

Miscellaneous

The role of the microbiology laboratory in the investigation of child sexual abuse C DYSON, IK HOSEIN. J Med Microbiol 1996; 45:313-8.

Emergency contraception: a survey of women's knowledge and attitudes

BH SMITH, EM GURNEY, L ABOULELEA, A TEMPLETON. Br J Obstet Gynaecol 1996;103: 1109-16.

The reliability of partner reports of sexual histories in a heterosexual STD clinic population

JA CATANIA. Sex Transm Dis 1996;23:522.

International Conference on Peyronie's Disease § Urol 1997;157:272-329.

Clinical guidelines panel on erectile dysfunction: summary report on the treatment of organic erectile dysfunction DK MONTAGUE, JH BARADA, AM BELKER, et al. J

Urol 1996;156:2007-13.

Sexual risk behaviour in women carriers of Mycoplasma hominis

S ELSHIBLY, I KALLINGS, D HELLBERG, PA MARDH. Br J Obstet Gynaecol 1996;103: 1124-8

Reliability of partner reports of sexual history in a heterosexual population at a

sexually transmitted diseases clinic

NJ ELLISH, CS WEISMAN, D CELENTANO, JM
ZENILMAN. Sex Transm Dis 1996;23:446-52.

Use and effectiveness of condoms during anal intercourse: a review

BG SILVERMAN, TP GROSS. Sex Transm Dis 1997;24:11-7.

Vulvodynia associated with coeliac disease C COSTELLO, JR SMITH. Br J Obstet Gynaecol 1996;103:1162-3.

Prokaryotic DNA sequences in patients with chronic idiopathic prostatitis
IN KRIEGER, DE RILEY, MC ROBERTS, RE BERGER.

IN KRIEGER, DE RILEY, MC ROBERTS, RE BERGER. J Clin Microbiol 1996;34:3120–8.

Painful ejaculation due to seminal vesicle calculi

JM CORRIERE. J Urol 1997;157:626-31.

Penetration of ampicillin and sulbactam into human epididymis and testis T KLOTZ, M BRAUN, A WILDFEUER, U

T KLOTZ, M BRAUN, A WILDFEUER, U ENGELMANN. Infection 1996;24:372-4.

Magnetic resonance imaging anatomy of the female urethra: a direct histologic comparison

K STROHBEHN, LE QUINT, MR PRINCE, et al. Obstet Gynecol 1996;88:750-6.

Two cases of benign vaginal rhabdomyoma. Case report
UM IVERSEN. APMIS 1996;104:575-8.